



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/526,750	11/14/2005	Thorsten Pferdekaemper	07781.0220	6924
22852 7590 05/01/2007 FINNEGAN, HENDERSON, FARABOW, GARRETT & DUNNER LLP 901 NEW YORK AVENUE, NW WASHINGTON, DC 20001-4413			EXAMINER SANDERS, AARON J	
			ART UNIT 2168	PAPER NUMBER
			MAIL DATE 05/01/2007	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/526,750

Applicant(s)

PFERDEKAEMPER ET AL.

Examiner

Aaron Sanders

Art Unit

2168

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 07 March 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-12 and 15-31 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-12 and 15-31 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 07 March 2005 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|----------------------------------------------------------------------------------------|-------------------------------------------------------------------|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>03/07/2005 and 07/13/2006</u> | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Priority

Application 10/526750, filed 7 March 2005, is the national stage entry of PCT/EP03/09827, filed 4 September 2003, which claims priority of provisional applications 60/408901, 60/408902, 60/408903, 60/408905, 60/409606, and 60/409593, filed 9 and 11 September 2002.

Response to Amendment

The amendment filed 7 March 2005 has been entered. Claims 1-12 and 15-31 are pending.

Drawings

Fig. 1 is objected to for improper shading. All drawings must be made by a process which will give them satisfactory reproduction characteristics. See 37 C.F.R. 1.84(l) and (m).

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the

Art Unit: 2168

renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Claim Rejections - 35 USC § 112 Second Paragraph

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claims 1, 11, 12, 22, 23, and 31 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

As per claims 1, 11, 12, and 23, the claims are indefinite because not every branch of the "if" statements have been disclosed. For example, it is unknown what steps the method performs in the case that the ID was not stored successfully, or if the ID is not contained in the first lock object.

As per claim 10, provides for the use of the method in enterprise resource planning software, but since the claim does not set forth any steps involved in the method, it is unclear what method Applicant is intending to encompass. A claim is indefinite where it merely recites a use without any active, positive steps delimiting how this use is actually practiced.

As per claims 22 and 31, the claims recite the limitation “the data array”. There is insufficient antecedent basis for this limitation in the claim because no “data array” is mentioned in claims 12 and 23 respectively. However, one is mentioned in claims 21 and 30.

Claim Rejections - 35 USC § 101

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

Claims 1-12 and 15-31 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

Claims 1-10 are directed to a method, claims 11 and 23-31 to a system, and claims 12-22 to a computer readable medium. The claimed subject matter lacks a practical application of a judicial exception (law of nature, abstract idea, naturally occurring article/phenomena) since it fails to produce a useful and tangible result.

As per claims 1-12 and 15-31, the claimed subject matter does not produce a tangible result because the claimed subject matter fails to produce a result that is limited to having real world value rather than a result that may be interpreted to be abstract in nature as, for example, a thought, a computation, or manipulation of data. More specifically, the read/write access is performed only after a series of if-then decisions have been made. If any of the “if” statements evaluate to false, there is no tangible output of the method. This produced result remains in the abstract and, thus, fails to achieve the required status of having real world value.

As per claims 1-10 and 15-22, the claimed subject matter does not produce a useful result because the claimed subject matter fails to sufficiently reflect at least one practical utility set

Art Unit: 2168

forth in the descriptive portion of the specification. More specifically, while the described practical utility (utilities) is (are) directed to controlling access to a data object by means of locks, the claimed subject matter relates ONLY to a method for accessing a data object having an identifier.

As per claims 11 and 23-31, the claimed subject matter does not produce a useful result because the claimed subject matter fails to sufficiently reflect at least one practical utility set forth in the descriptive portion of the specification. More specifically, while the described practical utility (utilities) is (are) directed to controlling access to a data object by means of locks, the claimed subject matter relates ONLY to a system for processing data.

As per claims 11 and 23-31, the system does not require any hardware, making it software *per se*. As such, the instant claims are non-statutory.

As per claims 12-22, according to the instant specification (see pg. 4, line 26 and pg. 17, line 21), the computer readable medium includes carrier waves. As such, the instant claims are non-statutory.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-12 and 15-31 are rejected under 35 U.S.C. 102(b) as being anticipated by Lenz, U.S. 5,566,319.

As per claims 1-12 and 15-31, Lenz teaches:

1. A method for accessing in a computer system a data object having an identifier (ID), comprising (See e.g. col. 1, line 66 – col. 2, line 23, “a method of controlling access to data in storage which data and storage are shared by a plurality of processors”):

storing the ID in a second lock object (See e.g. Fig. 3, where the claimed “second lock object” is the referenced array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.); and

determining whether the ID was stored successfully, and upon a successful storage, checking, before accessing the data object, whether the ID is contained in a first lock object (See e.g. Fig. 3 and col. 3, lines 1-10, “By using the search key ‘007’ during the execution of the lock instruction, the part of the lock file containing the control field for record 007 is addressed for writing” where the claimed “first lock object” is the referenced “Lock-File” 3-1) and if the ID is contained in the first lock object, whether a link to a storage location is assigned to the ID in the first lock object (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the control fields is associated with a corresponding data address”), and if the link is not assigned to the ID, deleting the ID from the first lock object and performing a read and/or write access on the data object (See e.g. Fig. 3 and col. 3, lines 51-62, “If the examination of the status identification code SKC shows that the write operation into the control field for account record 007, refer to 3-2 for instance, may be executed, this write operation is carried out and the status identification code SKC is updated according to the write request”).

2. The method of claim 1, wherein the first lock object is a file stored on a nonvolatile storage means (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the processors has a

Art Unit: 2168

local main storage. The shared storage is located outside of the main storage and stores a lock file”).

3. The method of claim 1, wherein the first lock object comprises a table, having a column for the ID and a column for the link of the ID to a storage location (See e.g. Fig. 3, “Lock-File” 3-1).

4. The method of claim 1, wherein each data object comprises one or more fields of one or more tables and wherein the ID comprises one or more key fields of the one or more tables (See e.g. Fig. 5).

5. The method of claim 4, wherein the link is a filename or a link to a file (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the control fields is associated with a corresponding data address”).

6. The method of claim 1, wherein the first lock object is created by a data moving process (See e.g. col. 1, line 66 – col. 2, line 23, “a method of controlling access to data in storage which data and storage are shared by a plurality of processors”).

7. The method of claim 1, wherein the second lock object is stored in a volatile storage means (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the processors has a local main storage. The shared storage is located outside of the main storage and stores a lock file”).

8. The method of claim 1, wherein the second lock object is a data array (See e.g. Fig. 3, the array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.).

9. The method of claim 8 wherein the data array is one dimensional (See e.g. Fig. 3, the array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.).

Art Unit: 2168

10. The method of claim 1 for use in an enterprise resource planning software (See e.g. col. 1, line 66 – col. 2, line 23, “a method of controlling access to data in storage which data and storage are shared by a plurality of processors”).

11. A computer system for processing data, comprising:
memory means for storing program instructions (See e.g. Fig. 3, “Local Main Storage 1” 3-6);

input means for entering data (See e.g. Fig. 3, “Writing”);

storage means for storing data (See e.g. Fig. 3, shared storage 3-9);

a processor responsive to the program instructions, wherein the program instructions comprise program code means for performing a method for accessing a data object having an identifier, the method comprising (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “a method of controlling access to data in storage which data and storage are shared by a plurality of processors”):

storing the ID in a second lock object (See e.g. Fig. 3, where the claimed “second lock object” is the referenced array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.); and

determining whether the ID was stored successfully, and upon a successful storage, checking, before accessing the data object, whether the ID is contained in a first lock object (See e.g. Fig. 3 and col. 3, lines 1-10, “By using the search key ‘007’ during the execution of the lock instruction, the part of the lock file containing the control field for record 007 is addressed for writing” where the claimed “first lock object” is the referenced “Lock-File” 3-1) and if the ID is contained in the first lock object, whether a link to a storage location is assigned to the ID in the first lock object (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the control fields is

Art Unit: 2168

associated with a corresponding data address”), and if the link is not assigned to the ID, deleting the ID from the first lock object and performing a read and/or write access on the data object (See e.g. Fig. 3 and col. 3, lines 51-62, “If the examination of the status identification code SKC shows that the write operation into the control field for account record 007, refer to 3-2 for instance, may be executed, this write operation is carried out and the status identification code SKC is updated according to the write request”).

12. A computer readable medium comprising instructions for performing a method for accessing a data object having an identifier in a computer system, the method comprising (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “a method of controlling access to data in storage which data and storage are shared by a plurality of processors”):

storing the ID in a second lock object (See e.g. Fig. 3, where the claimed “second lock object” is the referenced array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.); and

determining whether the ID was stored successfully, and upon a successful storage, checking, before accessing the data object, whether the ID is contained in a first lock object (See e.g. Fig. 3 and col. 3, lines 1-10, “By using the search key ‘007’ during the execution of the lock instruction, the part of the lock file containing the control field for record 007 is addressed for writing” where the claimed “first lock object” is the referenced “Lock-File” 3-1) and if the ID is contained in the first lock object, whether a link to a storage location is assigned to the ID in the first lock object (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the control fields is associated with a corresponding data address”), and if the link is not assigned to the ID, deleting the ID from the first lock object and performing a read and/or write access on the data object (See e.g. Fig. 3 and col. 3, lines 51-62, “If the examination of the status identification code SKC

Art Unit: 2168

shows that the write operation into the control field for account record 007, refer to 3-2 for instance, may be executed, this write operation is carried out and the status identification code SKC is updated according to the write request”).

13. (canceled)

14. (canceled)

15. The computer readable medium of claim 12, wherein the first lock object is a file stored on a nonvolatile storage means (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the processors has a local main storage. The shared storage is located outside of the main storage and stores a lock file”).

16. The computer readable medium of claim 12, wherein the first lock object comprises a table, having a column for the ID and a column for the link of the ID to a storage location (See e.g. Fig. 3, “Lock-File” 3-1).

17. The computer readable medium of claim 12, wherein each data object comprises one or more fields of one or more tables and wherein the ID comprises one or more key fields of the one or more tables (See e.g. Fig. 5).

18. The computer readable medium of claim 12, wherein the link is a filename or a link to a file (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the control fields is associated with a corresponding data address”).

19. The computer readable medium of claim 12, wherein the first lock object is created by a data moving process (See e.g. col. 1, line 66 – col. 2, line 23, “a method of controlling access to data in storage which data and storage are shared by a plurality of processors”).

20. The computer readable medium of claim 12, wherein the second lock object is stored in a volatile storage means (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the processors has a local main storage. The shared storage is located outside of the main storage and stores a lock file”).

21. The computer readable medium of claim 12, wherein the second lock object is a data array (See e.g. Fig. 3, the array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.).

22. The computer readable medium of claim 12, wherein the data array is one dimensional (See e.g. Fig. 3, the array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.).

23. A computer system for processing data, comprising (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “a method of controlling access to data in storage which data and storage are shared by a plurality of processors”):

means for storing an identifier (ID) in a second lock object (See e.g. Fig. 3, where the claimed “second lock object” is the referenced array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.); and

means for determining whether the ID was stored successfully, and upon a successful storage, checking, before accessing the data object, whether the ID is contained in a first lock object (See e.g. Fig. 3 and col. 3, lines 1-10, “By using the search key ‘007’ during the execution of the lock instruction, the part of the lock file containing the control field for record 007 is addressed for writing” where the claimed “first lock object” is the referenced “Lock-File” 3-1) and if the ID is contained in the first lock object, whether a link to a storage location is assigned to the ID in the first lock object (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the control fields is associated with a corresponding data address”), and if the link is not assigned to

Art Unit: 2168

the ID, deleting the ID from the first lock object and performing a read and/or write access on the data object (See e.g. Fig. 3 and col. 3, lines 51-62, "If the examination of the status identification code SKC shows that the write operation into the control field for account record 007, refer to 3-2 for instance, may be executed, this write operation is carried out and the status identification code SKC is updated according to the write request").

24. The computer system of claim 23, wherein first lock object is a file stored on a nonvolatile storage means (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, "Each of the processors has a local main storage. The shared storage is located outside of the main storage and stores a lock file").

25. The computer system of claim 23, wherein the first lock object comprises a table, having a column for the ID and a column for the link of the ID to a storage location (See e.g. Fig. 3, "Lock-File" 3-1).

26. The computer system of claim 23, wherein each data object comprises one or more fields of one or more tables and wherein the ID comprises one or more key fields of the one or more tables (See e.g. Fig. 5).

27. The computer system of claim 23, wherein the link is a filename or a link to a file (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, "Each of the control fields is associated with a corresponding data address").

28. The computer system of claim 23, wherein the first lock object is created by a data moving process (See e.g. col. 1, line 66 – col. 2, line 23, "a method of controlling access to data in storage which data and storage are shared by a plurality of processors").

Art Unit: 2168

29. The computer system of claim 23, wherein the second lock object is stored in a volatile storage means (See e.g. Fig. 3 and col. 1, line 66 – col. 2, line 23, “Each of the processors has a local main storage. The shared storage is located outside of the main storage and stores a lock file”).

30. The computer system of claim 23, wherein the second lock object is a data array (See e.g. Fig. 3, the array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.).

31. The computer system of claim 23, wherein the data array is one dimensional (See e.g. Fig. 3, the array of “Shared Data Record[s]” for “006”, “007”, “008”, etc.).

Conclusion


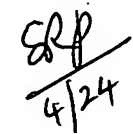
The prior art made of record and not relied upon is considered pertinent to applicant's disclosure: Hickson et al., U.S. 6,226,641; Hutchison et al., U.S. 6,651,123; and Krueger, U.S. 6,775,750.


Any inquiry concerning this communication or earlier communications from the Examiner should be directed to Aaron Sanders whose telephone number is 571-270-1016. The Examiner can normally be reached on M-Th 8:00a-5:00p.

If attempts to reach the Examiner by telephone are unsuccessful, the Examiner's supervisor, Tim Vo can be reached on 571-272-3642. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2168

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.


AJS

SRP
4/24


TIM VO
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2100